

PATENT COOPERATION TREATY

From the
INTERNATIONAL SEARCHING AUTHORITY

To:
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PCT

WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY

(PCT Rule 43bis.1)

Date of mailing
(day/month/year)

19 SEP 2007

FOR FURTHER ACTION

See paragraph 2 below

Applicant's or agent's file reference

APP 1566

International application No.

PCT/US05/09860

International filing date (day/month/year)

24 March 2005 (24.03.2005)

Priority date (day/month/year)

21 April 2004 (21.04.2004)

International Patent Classification (IPC) or both national classification and IPC

IPC: **G06F 17/30**(2006.01)

USPC: 707/3,10

Applicant

TELECORDIA TECHNOLOGIES, INC.

1. This opinion contains indications relating to the following items:

- | | | |
|-------------------------------------|--------------|--|
| <input checked="" type="checkbox"/> | Box No. I | Basis of the opinion |
| <input type="checkbox"/> | Box No. II | Priority |
| <input type="checkbox"/> | Box No. III | Non-establishment of opinion with regard to novelty, inventive step and industrial applicability |
| <input type="checkbox"/> | Box No. IV | Lack of unity of invention |
| <input checked="" type="checkbox"/> | Box No. V | Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement |
| <input type="checkbox"/> | Box No. VI | Certain documents cited |
| <input type="checkbox"/> | Box No. VII | Certain defects in the international application |
| <input type="checkbox"/> | Box No. VIII | Certain observations on the international application |

2. FURTHER ACTION

If a demand for international preliminary examination is made, this opinion will be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA") except that this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 66.1bis(b) that written opinions of this International Searching Authority will not be so considered.

If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of 3 months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later.

For further options, see Form PCT/ISA/220.

3. For further details, see notes to Form PCT/ISA/220.

Name and mailing address of the ISA/ US

Mail Stop PCT, Attn: ISA/US
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450

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Date of completion of this opinion

06 August 2007 (06.08.2007)

Authorized officer

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Form PCT/ISA/237 (cover sheet) (April 2005)

**WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY**

International application No.

PCT/US05/09860

Box No. I Basis of this opinion

1. With regard to the **language**, this opinion has been established on the basis of:

- ☒ the international application in the language in which it was filed
- ☐ a translation of the international application into _____, which is the language of a translation furnished for the purposes of international search (Rules 12.3(a) and 23.1(b)).

2. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application and necessary to the claimed invention, this opinion has been established on the basis of:

a. type of material

- ☐ a sequence listing
- ☐ table(s) related to the sequence listing

b. format of material

- ☐ on paper
- ☐ in electronic form

c. time of filing/furnishing

- ☐ contained in the international application as filed.
- ☐ filed together with the international application in electronic form.
- ☐ furnished subsequently to this Authority for the purposes of search.

3. ☐ In addition, in the case that more than one version or copy of a sequence listing and/or table(s) relating thereto has been filed or furnished, the required statements that the information in the subsequent or additional copies is identical to that in the application as filed or does not go beyond the application as filed, as appropriate, were furnished.

4. Additional comments:

**WRITTEN OPINION OF THE
INTERNATIONAL SEARCHING AUTHORITY**

International application No.
PCT/US05/09860

Box No. V Reasoned statement under Rule 43 bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement

1. Statement

Novelty (N)	Claims <u>8-9 and 16-19</u>	YES
	Claims <u>1-7 and 10-15</u>	NO
Inventive step (IS)	Claims <u>NONE</u>	YES
	Claims <u>1-19</u>	NO
Industrial applicability (IA)	Claims <u>1-19</u>	YES
	Claims <u>NONE</u>	NO

2. Citations and explanations:

Claims 1-7 and 10-15 lack novelty under PCT Article 33(2) as being anticipated by Moon. Moon teaches querying a reference database for a reference database record that matches the input data (sections 107 and 111). Moon teaches if a matching reference database record is found, querying any of the plurality of target databases for the one or more target database records that correspond to the reference database record (sections 79 and 69). Moon teaches receiving an input data query, based on an input data type, selecting from among a plurality of reference databases one or more reference databases (sections 78 and 85). Moon teaches if a single reference database is selected: querying the single reference database for a reference database record that matches the input data (section 43) and if a matching reference database record is found, using the matching reference database record for subsequent queries of the one or more target databases for the one or more target database records (section 8).

Claims 8-9 and 16-19 lack an inventive step under PCT Article 33(3) as being obvious over Moon in view of Bugajski. Moon teaches a set of reference-based mapping rules for matching input data queries to reference database records (section 7). Moon teaches a validation and mapping process that given an input data query, use the set of reference-based mapping rules to match a record in a selected reference database to the given input data (section 6). Moon teaches the target-based query rules to match the one or more target database records in the one or more target databases to the matched reference database record or to a canonical form of the matched reference database record (sections 7-8). Moon does not explicitly indicate claimed canonical form. However, Bugajski teaches claimed canonical form (fig. 2 and col. 10, lines 51-54). Therefore, based on Moon in view of Bugajski, it would have been obvious to one having ordinary skill in the art at the time the invention was made to utilize the teaching of Bugajski to the system of Moon in order to optimize the speed of comparing the new input to the associations already learned.

Claims 1-19 meet the criteria set out in PCT Article 33(4), and thus have industrial applicability because the subject matter claimed can be made or used in industry.